CLAIMS AMENDMENTS

Please amend claims 88, 89, 91, 92 and 93 as follows:

Claims 1-87 (canceled)

Claim 88 (currently amended): An automated bio-matter processing apparatus, comprising:

a grinder adapted to receive the bio-matter and to extract juice from the bio-matter;

a juice pH monitoring and adjustment system located downstream of the grinder to receive the juice from the grinder and to monitor and adjust pH of the juice;

a heater located downstream of the juice pH monitoring and adjustment system to receive pH adjusted juice and to heat the pH adjusted juice to a first temperature for a first length of time;

a centrifuge located downstream of the heater to receive heated pH adjusted juice and to separate the heated pH adjusted juice into a pellet stream and a supernatant stream; and

said grinder, said juice pH monitoring and adjustment system, said heater and said centrifuge being connected together for continuous processing of said bio-matter; and

a computerized control system communicated with the grinder, the juice pH monitorizing and adjustment system, the heater and the centrifuge, so that the control system monitors and controls the automated processing apparatus.

Claim 89 (currently amended): The apparatus of claim 88, further comprising:

An automated bio-matter processing apparatus, comprising:

a grinder adapted to receive the bio-matter and to extract juice from the bio-matter;

a juice pH monitoring and adjustment system located downstream of the grinder to receive the juice from the grinder and to monitor and adjust pH of the juice;

a heater located downstream of the juice pH monitoring and adjustment system to receive pH adjusted juice and to heat the pH adjusted juice to a first temperature for a first length of time;

a centrifuge located downstream of the heater to receive heated pH adjusted juice and to separate the heated pH adjusted juice into a pellet stream and a supernatant stream;

a computerized control system communicated with the grinder, the juice pH monitorizing and adjustment system, the heater and the centrifuge, so that the control system monitors and controls the automated processing apparatus; and

a filtering system located downstream of the supernatant stream from the centrifuge to filter the supernatant stream. Claim 90 (original): The apparatus of claim 89, wherein the filtering system comprises:

at least one first filter; and a separate ultrafiltration system.

Claim 91 (currently amended): The apparatus of claim 88, further comprising: An automated bio-matter processing apparatus, comprising:

a grinder adapted to receive the bio-matter and to extract juice from the bio-matter;

a juice pH monitoring and adjustment system located downstream of the grinder to receive the juice from the grinder and to monitor and adjust pH of the juice;

a heater located downstream of the juice pH monitoring and adjustment system to receive pH adjusted juice and to heat the pH adjusted juice to a first temperature for a first length of time;

a centrifuge located downstream of the heater to receive heated pH adjusted juice and to separate the heated pH adjusted juice into a pellet stream and a supernatant stream;

a computerized control system communicated with the grinder, the juice pH monitorizing and adjustment system, the heater and the centrifuge, so that the control system monitors and controls the automated processing apparatus;

a resuspension tank located downstream of the pellet stream from the centrifuge;

a pellet stream pH monitoring and adjustment system located downstream of the resuspension tank; and

a second centrifuge located downstream of the pellet stream pH monitoring adjustment system.

Claim 92 (currently amended): The apparatus of claim 88, wherein the grinder comprises:

a first cutter, including blades to cut leafy material;

a second cutter, including blades to cut leafy material; and

a press.

Claim 93 (currently amended): The apparatus of claim 88, wherein the heater comprises:

a flexible length piping apparatus <u>including a pipe capable of having</u> fluid flowing therethrough.